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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/511,648	10/18/2004	Ivonete Markman	PU020120	. 6431
24498 THOMSON I	7590 11/15/2007	•	EXAMINER	
THOMSON LICENSING LLC Two Independence Way			HA, DAC V	
Suite 200 PRINCETON,	, NJ 08540		ART UNIT	PAPER NUMBER
			2611	
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			MAIL DATE	DELIVERY MODE
			11/15/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAY WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. Extensions of term may be waitable under the provisions of 37 CFR 1.136(a). In ore event, however, may a tepty be timely filed after SIX (6) MONTHS from the mailing date of this communication. Failure to reply within the set ore skinded period for rapily will, by statule, cause the explication to become ARANDONED (38 U SC. 9, 133). Any reply received by the Office later tend norther months after the mailing date of this communication, even if timely filed, may reduce any removed partition to become ARANDONED (38 U SC. 9, 133). Any reply received by the Office later tend norther months after the mailing date of this communication, even if timely filed, may reduce any removed partition the signal and ARANDONED (38 U SC. 9, 133). Any reply received by the Office later tend three months after the mailing date of this communication, even if timely filed, may reduce any remove any remove and tender that the set of the communication is in condition for allowance except for formal matters, prosecution as to the meritic closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213. Disposition of Claims 4) Claim(s) 1-29 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) Claim(s) is/are objected to. 6) Claim(s) is/are rejected. 7) Claim(s) is/are objected to. 8) Claim(s) is/are objected to by the Examiner. 10) The drawing(s) filed on 18 October 2004 is/are: a) accepted or b) objected to by the Examiner. Application Papers 9) The specification is objected to by the Examiner. Note the altrached Office Action or form PTO-152 Priority under 35 U.S.C. § 119 11) The oath or declaration is objected to by the Examiner. Note the altrached Office Action or form PTO-152 Priority under 35 U.S.C. § 119 12) Acknowledgment is made of a claim for for						
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Dac V. Ha			10/511,648	MARKMAN ET AL.		
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2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) 4) Interview Summary (PTO-413) Paper No(s)/Mail Date. 5) Notice of Informal Patent Application	1) Notice 2) Notice	ce of References Cited (PTO-892) ce of Draftsperson's Patent Drawing Review (PTO-948)	Paper			

Art Unit: 2611

DETAILED ACTION

Claim Objections

1. Claims 1 are objected to because of the following informalities:

Claim 1, line 4, "DFE"; line 6, "dd" should be defined when first mentioned.

Applicant is requested to find and correct similar problem in the other claims 2-29.

Appropriate correction is required.

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 1-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ahn (US 6,671,339).
- Re. Claim 12, Ahn discloses claimed subject matter "Apparatus for automatic selection of one of a standard automatic switching mode and an automatic switching mode" "for receiving a data signal, said equalizer including a lock detector for providing a lock signal indicative of equalizer convergence and wherein said selection is based on monitoring of the rate of transitions of said lock signal", in Fig. 4, elements 103, 106; Fig. 7, 8; col. 4, lines 7-22; 47-54; col. 6, lines 1-62; col. 8, line 17 to col. 9, line 42,

Application/Control Number: 10/511,648 Page 3

Art Unit: 2611

where in the determination of how fast the lock signal meets the requirement so the equalizer would switch from one mode to another teaches "rate of transition". Ahn differs from the claimed invention in that Ahn doesn't dislclose the equalizer is a "decision feedback equalizer". However, given the adaptation disclosed by Ahn, one skilled in the art would have easily implemented such equalizer with decision feedback equalizer".

Re. Claim 13, Ahn further discloses "wherein said selection is based on whether said rate of transitions is less than or not less than a prescribed rate" in col. 6, lines 26-62; col. 8, lines 60-67.

Re. Claim 14, Ah further discloses "when said ... mode is selected" in col. 8, line 60 to col. 9, line 42.

Re. Claim 15, Ahn further discloses "wherein said prescribed rate is defined as a threshold count of transitions with a window period" in col. 8, lines 15-19.

Re. Claim 16, Ahn further suggests the teaching of "wherein said window period is defined in terms of symbol counts of said data signal" in col. 7, line 20 to col. 8, line 29.

Re. Claims 17-20, these claimed subject matter would have been easily realized by one skilled in the art as application specific/preference based on the concept disclosed by Ahn.

Re. Claim 1, Ahn discloses:

"an equalizer ... dd mode" (Fig. 4, element 103);

"said equalizer incuding a lock detector ... convergence" (Fig. 4, element 106)

Art Unit: 2611

"a mode selector .. lock signal" (Fig. 4, element 103a). Ahn differs from the claimed invention in that Ahn doesn't dislclose the equalizer is a "decision feedback equalizer". However, given the adaptation disclosed by Ahn, one skilled in the art would have easily implemented such equalizer with decision feedback equalizer".

Re. Claim 21, similar to claim 20 above, the claimed subject matter in claim 21 would have been easily realized based on the concept disclosed by Ahn.

Re. Claims 2-11, 22-29, these claimed subject matter are variation in wording of that in claim 21 above, thus would have been easily realized by one skilled in the art based on the concept in Ahn's as well.

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Paik et al. (US 5,311,546)

Werner et al. (US 5,809,074)

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dac V. Ha whose telephone number is 571-272-3040. The examiner can normally be reached on 4/4.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Payne can be reached on 571-272-3024. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 10/511,648 Page 5

Art Unit: 2611

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Dac V. Ha Primary Examiner Art Unit 2611